

2

1c971 U.S. PTO
10/028657
12/21/01

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant: Vlad J. Novotny

Assignee: Active Optical Networks, Inc.

Title: "PATTERN-TRANSFER PROCESS FOR FORMING MICRO-ELECTRO-MECHANICAL STRUCTURE"

Serial No.: Unknown Filed: December 21, 2001

Examiner: Unknown Tel: Unknown

Docket No.: AO-001-1D Art Unit: Unknown

December 21, 2001

Box Patent Application
Assistant Commissioner For Patents
Washington, D.C. 20231

INFORMATION DISCLOSURE STATEMENT

Sir:

Pursuant to 37 C.F.R. §1.56, §1.97 and §1.98, Applicant brings the 23 documents listed on the enclosed forms PTO-1449 to the Examiner's attention in the above-captioned application. Citation of the listed documents shall not be construed as:

1. an admission that the documents are necessarily prior art with respect to the instant application;
2. a representation that a search has been made; or
3. an admission that the information cited is, or is considered to be, material to patentability as defined in §1.56(b).

Copies of the listed documents on pages 1-3 are not provided because they were cited in a prior application (serial No. pending) entitled "Multi-Axis Micro-Electro-Mechanical Actuator," by Vlad J. Novotny and Yee-Chung Fu, filed December 20, 2001, that is relied upon for an earlier filing date under 35 U.S.C. §120.

I hereby certify that this correspondence is being deposited with the United States Postal Service as "Express Mail Post Office to Addressee" service under 37 CFR §1.10 on the date indicated below and is addressed to: Box Patent Application, Commissioner for Patents, Washington, D.C. 20231, on December 21, 2001.

December 21, 2001
Date

Laurie Moreno

Express Mail No.: EF055078336US

Respectfully submitted,

Arthur J. Behiel
Attorney for Applicants
Reg. No. 39,603

U.S. Department of Commerce, Patent and Trademark Office	Serial No.: Unknown
	Filing Date: 12/21/01
INFORMATION DISCLOSURE STATEMENT BY APPLICANT	Inventor: Vlad J. Novotny
"Pattern-Transfer Process For Forming Micro-Electro-Mechanical Structures"	Group Art Unit: Unknown
	Examiner Name: Unknown
Express Mail Receipt No. EF055078336US	Attorney Docket No.: AO-001-1D

U.S. Patent Documents

*Examiner Initial	Document Number	Date	Name	Class	Subclass	Filing Date, If Appropriate
AA	6,301,403 B1	10/09/01	Heanue et al.	385	18	
AB	6,253,001 B1	06/26/01	Storrs T. Hoen	385	17	
AC	6,028,689	02/22/00	Michalicek et al.	359	224	
AD	5,872,880	02/16/99	Ronald S. Maynard	385	88	
AE	6,283,601 B1	09/04/01	Hagelin et al.	359	871	

Foreign Patent Documents

							Translation	
	Document Number	Date	Country	Class	Subclass		Yes	No
AF								

OTHER ART (Including Author, Title, Date, Pertinent Pages, Etc.)

AG	"ROUTING PACKETS WITH LIGHT," Daniel J. Blumenthal. Scientific American, pages 96-99. January 2001.
AH	"Construction and performance of a 576x576 single-stage OXC," Herzel Laor. LEOS, San Francisco, California, 3 pages. November 8, 1999.
AI	"Application of micro- and nanotechnologies for the fabrication of optical devices," Wolfgang Ehrfeld and Hans-Dieter Bauer. SPIE Vol. 3276, page 2 and pages 4-14.
AJ	"PERFORMANCE OF A 576x576 OPTICAL CROSS CONNECT," Laor, et al. NFOEC, Chicago, Illinois, pages 1-5. September 26, 1999.
AK	"Control and shape design of an electrically-damped comb drive for digital switches," Yijian Chen. Proceedings of SPIE Vol. 4178, 2000. Pages 387-394.

Examiner

Date Considered

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with your communication to applicant.

 10/28/01
 10/28/01
 10/28/01

12/21/01

U.S. Department of Commerce, Patent and Trademark Office						Serial No.: Unknown	
						Filing Date: 12/2/01	
INFORMATION DISCLOSURE STATEMENT BY APPLICANT						Inventor: Vlad J. Novotny	
"Pattern-Transfer Process For Forming Micro-Electro-Mechanical Structures"						Group Art Unit: Unknown	
						Examiner Name: Unknown	
Express Mail Receipt No. EF055078336US						Attorney Docket No.: AO-001-1D	
U.S. Patent Documents							
*Examiner Initial		Document Number	Date	Name	Class	Subclass	Filing Date, If Appropriate
	AL						
Foreign Patent Documents							
							Translation
		Document Number	Date	Country	Class	Subclass	Yes No
	AM						
OTHER ART (Including Author, Title, Date, Pertinent Pages, Etc.)							
	AN	"THE RISE OF OPTICAL SWITCHING," David J. Bishop et al. Scientific American, pages 88-94. January 2001.					
	AO	"A LARGE-DEFLECTION ELECTROSTATIC ACTUATOR FOR OPTICAL SWITCHING APPLICATIONS," John D. Grade, Hal Jerman and Thomas W. Kenny. Presented at Hilton Head, 2000. 4 pages.					
	AP	"FLIP CHIP CHALLENGES," Steve Bezuk, PH.D. General Manager, Applied Technology Development and Flip Chip Kyocera America, Inc. First published in HDI Magazine, February 2000. 6 pages.					
	AQ	"MEMS Feedback Control Using Through-Wafer Optical Device Monitoring," J.M. Dawson, et al. Proceedings of SPIE Vol. 4178, 2000. Pages 221-227.					
	AR	"A FLAT HIGH-FREQUENCY SCANNING MICROMIRROR," Robert A. Conant, et al. 2000 Solid-State Sensor & Act Workshop, Hilton Head, S.C., June 4-8, 2000.					
	AS	"The Surface/Bulk Micromachining (SBM) Process: A New Method for Fabricating Released MEMS in Single Crystal Silicon," Sangwoo Lee, et al. Journal of Microelectromechanical Systems, Vol. 8, No. 4, December 1999. Pages 409-416.					
	AT	"MEMS actuators for silicon micro-optical elements," Norman C. Tien and Daniel T. McCormick. Proceedings of SPIE Vol. 4178, 2000. 256-267.					
Examiner				Date Considered			
<p>*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with your communication to applicant.</p>							

U.S. Department of Commerce, Patent and Trademark Office						Serial No.: Unknown	
						Filing Date: 12/21/01	
INFORMATION DISCLOSURE STATEMENT BY APPLICANT						Inventor: Vlad J. Novotny	
"Pattern-Transfer Process For Forming Micro-Electro-Mechanical Structures"						Group Art Unit: Unknown	
						Examiner Name: Unknown	
Express Mail Receipt No. EF055078336US						Attorney Docket No.: AO-001-1D	
U.S. Patent Documents							
*Examiner Initial		Document Number	Date	Name	Class	Subclass	Filing Date, If Appropriate
	AU						
Foreign Patent Documents							
							Translation
		Document Number	Date	Country	Class	Subclass	Yes No
	AV						
OTHER ART (Including Author, Title, Date, Pertinent Pages, Etc.)							
	AW	"Lightweight, Optically Flat Micromirrors for Fast Beam Steering," Jocelyn T. Nee, et al. Presented at IEEE/LEOS Optical MEMS 2000 Conference, August 21-4, 2000, Kauai, Hawaii, USA. 2 pages.					
	AX	"Optical MEMS for Optical Communications - Trends and Developments," Veljko Milanovic. Adriatic Research Institute. Pages 2-6. Downloaded December 20, 2001.					
	AY						
	AZ						
	BA						
	BB						
Examiner				Date Considered			
<p>*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with your communication to applicant.</p>							

U.S. Department of Commerce, Patent and Trademark Office	Serial No.: Unknown
	Filing Date: 12/21/01
INFORMATION DISCLOSURE STATEMENT BY APPLICANT	Inventor: Vlad J. Novotny
"Pattern-Transfer Process For Forming Micro-Electro-Mechanical Structures"	Group Art Unit: Unknown
	Examiner Name: Unknown
Express Mail Receipt No. EF055078336US	Attorney Docket No.: AO-001-1D

U.S. Patent Documents

*Examiner Initial		Document Number	Date	Name	Class	Subclass	Filing Date, If Appropriate
	BC	6,252,466 B1	06/26/01	J. Patrick Kawamura	331	25	
		6,097,859	08/01/00	Solgaard et al.	385	17	

Foreign Patent Documents

							Translation	
		Document Number	Date	Country	Class	Subclass	Yes	No
	BD							

OTHER ART (Including Author, Title, Date, Pertinent Pages, Etc.)

	BE	Topical Review "The future of MEMS in telecommunications networks," James A. Walker. J. Micromech, Microeng.10(2000)R1-R7. Printed in the UK.
	BF	D.J. Bishop Presentation, "Silicon Micromachines for Lightwave Networks: Can Little Machines Make it Big?" Lucent Technologies, Bell Labs Innovations. 83 pages. Date unknown.
	BG	
	BH	
	BI	
	BJ	

Examiner

Date Considered

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with your communication to applicant.